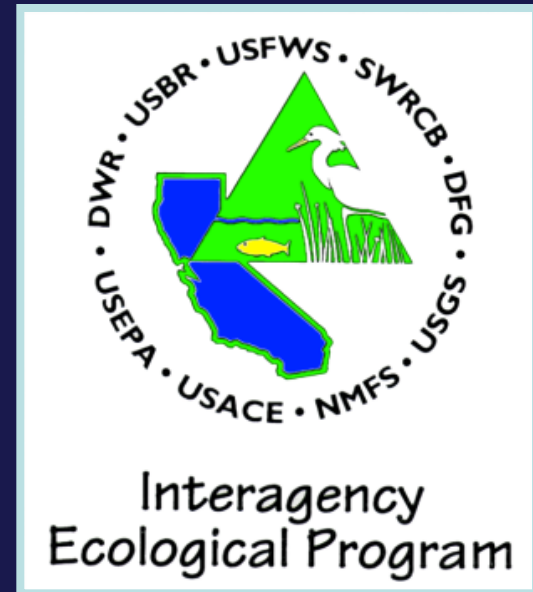


Interagency Ecological Program

Cooperative Ecological Investigations
in the San Francisco Estuary since 1970

Anke Mueller-Solger
Lead Scientist

Delta Conservancy Board
February 23, 2011



Four decades ago...

Testimony at 1969-70 SWRCB Water Rights Hearings:

- “Fish and wildlife problems” in the estuary
- SWP & CVP may contribute

Need studies to

- Understand fish and wildlife resource requirements
- Find ways to minimize SWP & CVP impacts

1970 IEP MOA

USBR

USFWS

IN WITNESS WHEREOF, the parties hereto have executed this Memorandum
of Agreement on July 13, 1970.

U. S. BUREAU OF RECLAMATION
Region 2

By R.J. Paffendorf

U. S. BUREAU OF SPORT FISHERIES
AND WILDLIFE, Region 1

By John D. Findlay
JOHN D. FINDLAY
Regional Director

CALIF. DEPARTMENT OF WATER RESOURCES

By W.W. Grunelli

CALIF. DEPARTMENT OF FISH & GAME

By [Signature]

I hereby certify that all conditions for exemption set
forth in State Administrative Manual Section 1231.13 have
been complied with and this document is exempt from
review by the Department of Finance.

By [Signature]

Approved as to legal form
and substance:

[Signature]

DWR

DFG

1970: Interagency Ecological Studies Program (IESP)

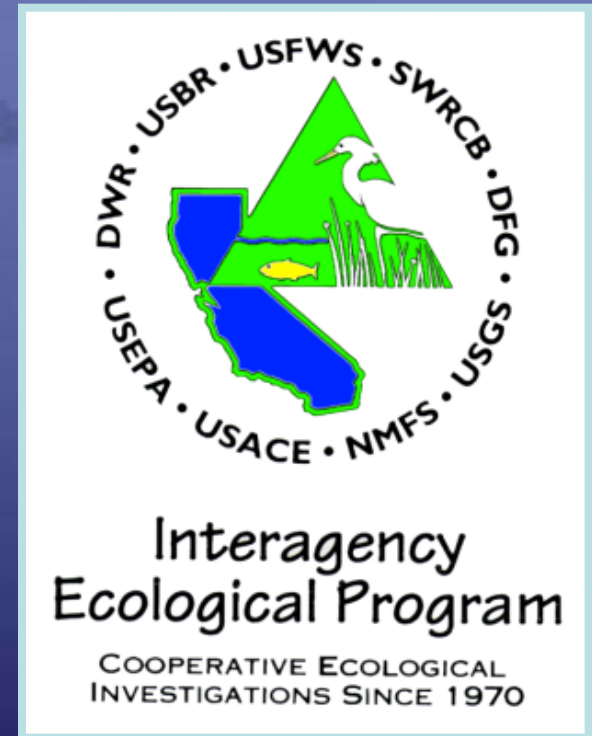
1970-1982: Focused **studies** to allow “full” water project development (with Peripheral Canal etc)

1982-90s: **Monitoring** and studies to meet regulatory requirements & evaluate effects of project operations, fish facilities, barriers

1993: Program review – reorganization, **IEP**

2005+: Pelagic Organism Decline (POD) **study** focus

Long-term Interagency Science Cooperation,
Science Informing Policy Solutions



... to 2011: The IEP at 41




Interagency Ecological Program

COOPERATIVE ECOLOGICAL
INVESTIGATIONS SINCE 1970

- Science Consortium with 6 Federal & 3 State Agencies, + other Agency & Academic Partners
- ~ \$30 M annually for “Core,” “Directed,” & “Coordinated” Elements
- 2010 IEP Workplan: 126 Program Elements

May 26 & 27, 2009, CALFED Delta Room, Sacramento:
Public IEP Workshop featuring



the latest models combining
physics and fish
and a panel of
IEP Science Advisors

[Click here to read more...](#)

**Analysis
Synthesis
Review**

**Interagency Ecological Program
2010 Pelagic Organism Decline Work Plan
and
Synthesis of Results**



IEP NEWSLETTER

Modeling

Communication

**Long-Term
Cooperation**


Monitoring

Research

*Dr. IEP Science ...
Does Interagency
Science for Policy*




Public IEP Workshop
August 18-19, 2009
Central Valley Regional Water Quality Control Board,
Rancho Cordova, CA



**Ammonia
Summit**
Assessing the Role of Ammonia/um
in the Delta & Suisun Bay Ecosystem

[Click here to read more...](#)

The IEP at 41 – Bay-Delta Science “Family”



Policy for
Science

Agency Directors
Agency Coordinators

Science-Policy
Interface

Leadership Team

Science Advisory Group
Stakeholder Group

Science for
Policy

Management Team(s)
Project Work Teams
Program Elements

2011 IEP WORKSHOP: March 30, 2011, Lake Natoma Inn, Folsom

http://www.water.ca.gov/iep/



Interagency Ecological Program

Cooperative Ecological Investigations
in the San Francisco Estuary since 1970

IEP Home

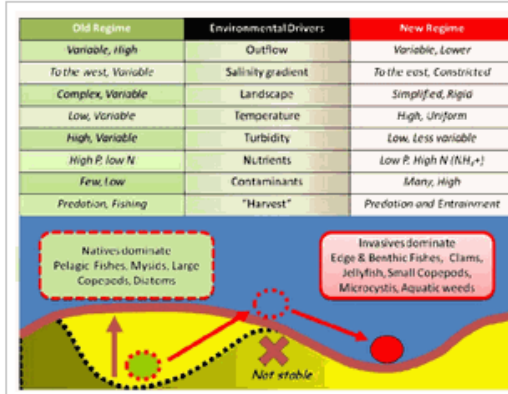
ACTIVITIES

- Monitoring
- Research
- Pelagic Organism Decline (POD) Investigations
- Program Reviews
- Calendar
- Workshops and Events
- Archive

PRODUCTS

- Data and Metadata
- IEP Newsletter
- Technical Reports
- Journal Publications
- Maps

2010 PELAGIC ORGANISM DECLINE WORK PLAN AND SYNTHESIS OF RESULTS.



The IEP has released a progress report entitled "2010 Pelagic Organism Decline (POD) Work Plan and Synthesis of Results." The POD Management Team is interested in collecting comments that identify information gaps or comments that can inform the final report planned for 2012/13. Send comments to Kelly Souza at ksouza@dfg.ca.gov. While we may not directly respond to your feedback, we may post any comments received on the IEP website.

(Monday, December 6, 2010)

► [Work Plan and Synthesis of Results](#)

Please [click here](#) to take the IEP Data Users Survey

MONITORING



The annual "Status and Trends" issue of the IEP

RESEARCH



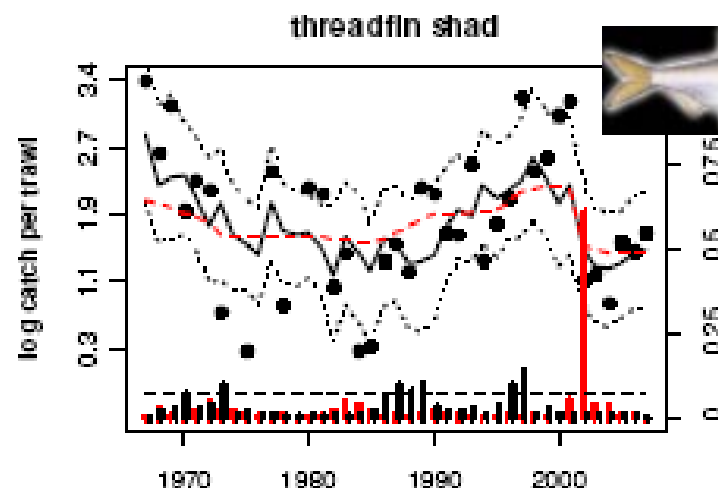
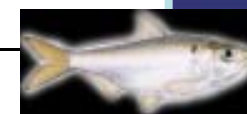
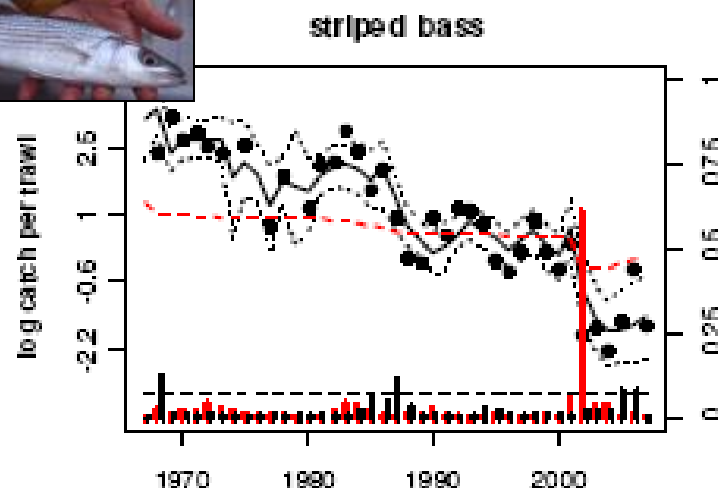
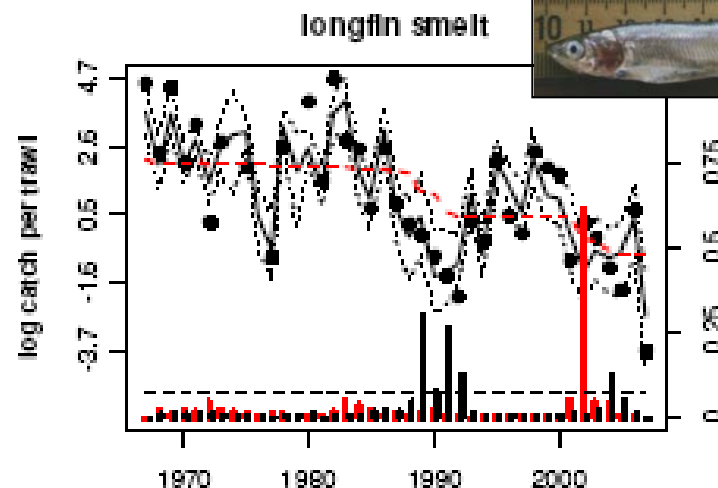
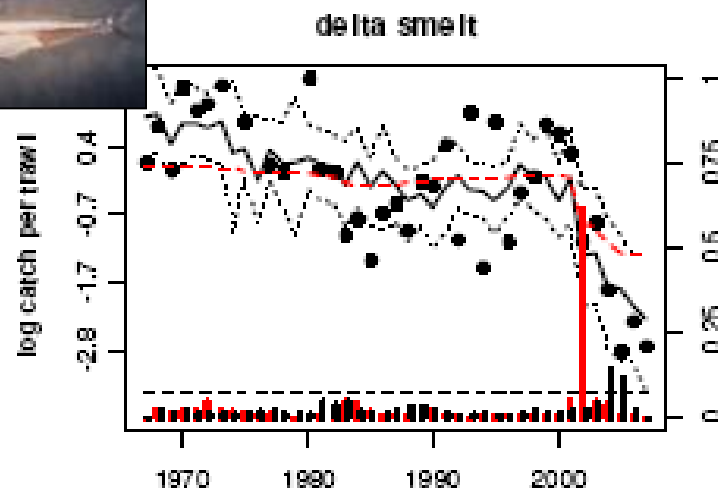
Old school vs. new school: status of threadfin

WORKSHOPS AND EVENTS

[Dreissenid Mussel Summit](#)
October 21-22, 2010
Lions Gate Hotel, Sacramento

Long-term IEP Monitoring Shows Fish Declines

POD Change Point in 2002



POD Workplans & Synthesis:

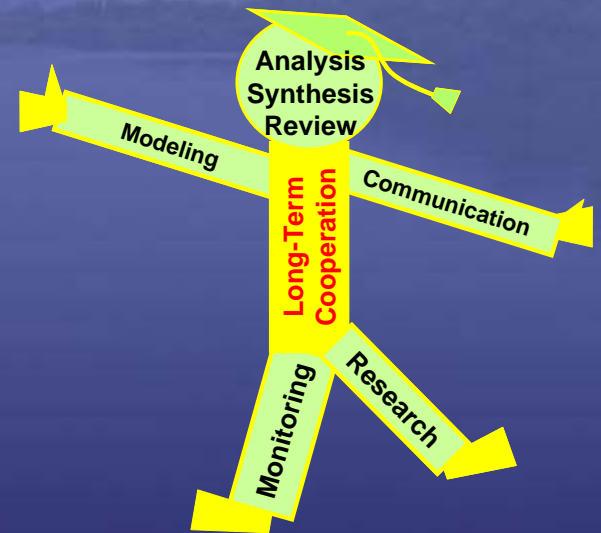
Conceptual Models

- Link Drivers/Stressors and Effects
- Tell POD Story from Different Perspectives
 - Multiple Drivers/Stressors in Combination
 - Species-Specific Effects
 - Ecological Regime Shift

Future of the IEP – the next 40 years? Growing Interagency Science Cooperation

to meet

- Continuing Science Needs
- New Science Needs, e.g.
 - Ecosystem Restoration - Delta Conservancy
 - Delta Plan - Delta Stewardship Council
 - Bay-Delta Conservation Plan
 - Water Quality Initiatives – EPA and Water Boards
 - Science Integration, Synthesis and Communication



*Dr. IEP Science ...
Does Interagency
Science for Policy*



Additional Information

Interagency Ecological Program:
<http://www.water.ca.gov/iep>

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Kelly Souza – ksouza@dfg.ca.gov

Bruce Herbold - Herbold.Bruce@epamail.epa.gov

Thanks!